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10/767,574	01/29/2004	Jean Philippe Vasseur	CISCp850	6189
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Cindy S. Kaplan			EXAMINER	
P.O. BOX 2448			WONG, BLANCHE	
SARATOGA, CA 95070				
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		2419		
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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

### Office Action Summary

**Application No.**

10/767,574

**Applicant(s)**

VASSEUR ET AL.

**Examiner**

Blanche Wong

**Art Unit**

2419

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 06 November 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 4-18, 22-30, 34-48, 52-60 and 65-74 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 4-18, 22-30, 34-48, 52-60 and 65-74 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Response to Arguments***

1. Applicant's arguments with respect to claims 4-18,22-30,34-48,52-60 and 65-74 have been considered but are moot in view of the new ground(s) of rejection.

### ***Claim Objections***

2. Claims 4 and 13 are objected to because of the following informalities:

With regard to claim 4, Examiner suggests removing the amendment "in said second autonomous system" after "said tail-end node" in lines 7-8 and adding "in a second autonomous system" after "a tail-end node" in line 4. Additionally, Examiner suggests replacing "a second autonomous system" in line 6 with "said second autonomous system" accordingly.

With regard to claim 13, Examiner suggests replacing "a second area" in line 9 with "said second area" because there is "a second area" in the preamble.

Appropriate correction is required.

### ***Claim Rejections - 35 USC § 112***

3. **Claims 4-18,22-30,34-48,52-60 and 65-74** are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

With regard to all the independent claims, the claim language/limitations do not reflect a path but just parts of a path, and does not mention the full connection between e.g. in claim 4, between the first autonomous system and the tail-end node; in claim 8, between the head-end node in the first autonomous system to the tail-end node in the second autonomous system, etc. as set forth in the preamble. (The full list in detail is to follow.) Additionally, Examiner notes that 1) not all the first, second, third autonomous systems or areas are inter-connected to each other, e.g. in claim 4, the second and the third autonomous systems are disconnected; in claim 8, the second and the third autonomous systems are disconnected, etc. and 2) Applicant has amended and replaced "MPLS Traffic Engineering" with "Traffic Engineering" alone. Examiner has found that Traffic Engineering is not a term of the art because there are different types of traffic engineering e.g. RSVP Traffic Engineering. Even if Traffic Engineering means MPLS Traffic Engineering, there isn't any limitation to specify or show Label Switch Paths or any LSP Attributes e.g. traffic engineering tunnels. If the significance of Traffic Engineering LPS is carried out only in the preamble but not in the body of the claims, Examiner suggests either the removal of the wording from the preamble, or the introduction of which in the body of the claim.

With regard to claim 4, it is unclear how the method completes the establishing an inter-autonomous system Traffic Engineering Label Switched Path (LSP) between the first autonomous system and the tail-end node. From the claim language, Examiner is able to extract that the second path computation element in the second autonomous

system communicates with the first path computation element in the first autonomous system, and then the first path computation element in the first autonomous system communicates with the third path computation element in the third autonomous system. Thus, inter-autonomy is established. Additionally, within the claim language, there are also the virtual shortest path tree information with path(s) from the tail-end node to one or more border routers between the first and second autonomous systems, and the revised virtual shortest path tree information with path(s) from the tail-end node to one or more border routers between the first and third autonomous systems. However, Examiner is unable to find any relationship to Traffic Engineering LSP or any one path between the first autonomous system and a tail-end node, as recited in the preamble of claim 4. Furthermore, Examiner notes that the second and third autonomous systems may not be connected.

With regard to claim 8, it is unclear how the method completes the establishing a Traffic Engineering Label Switched Path (LSP) between the head-end node in the first autonomous system to the tail-end node in the second autonomous system. From the claim language, Examiner is able to extract that the first and second path computation element in the first and second autonomous systems respectively communicates with each other. Additionally, within the claim language, there are also the path computation request and the virtual shortest path tree information with path(s) from the tail-end node to one or more border routers between the first and third autonomous systems. However, Examiner is unable to find any relationship to Traffic Engineering LSP or any

one path between the head-end and the tail-end nodes, as recited in the preamble of claim 8. Furthermore, Examiner notes that the second and third autonomous systems may not be connected.

With regard to claim 13, it is unclear how the method completes the establishing a Traffic Engineering Label Switched Path (LSP) between the head-end node in the first area and the tail-end node in the second area. From the claim language, Examiner is able to extract that the first path computation element in the first autonomous system communicates with the second path computation element in the second autonomous system. Additionally, within the claim language, there are also the virtual shortest path tree information with path(s) from the head-end node to to one or more border routers between the first and third areas. However, Examiner is unable to find any relationship to Traffic Engineering LSP or any one path between the head-end and tail-end nodes, as recited in the preamble of claim 13. Furthermore, Examiner notes that the second and third autonomous systems may not be connected.

With regard to claim 16, it is unclear how the method completes the establishing a Traffic Engineering Label Switched Path (LSP) between the head-end node in the third area to the tail-end node in the first area. From the claim language, Examiner is able to extract that the first path computation element is a border router between the first and second areas. Additionally, within the claim language, there is also the virtual shortest path tree information with path(s) from the head-end node to one or more

border routers between the third and second areas. However, Examiner is unable to find any one path between the head-end and tail-end nodes, as recited in the preamble of claim 16. Furthermore, it is unclear what is meant by "a path for said Traffic Engineering LSP" in lines 10-11, or whether the path is a LSP and if so, how is the path a LSP.

With regard to claim 22, it is unclear how the method completes the establishing an inter-area Traffic Engineering Label Switched Path (LSP) between said first area and the tail-end node. From the claim language, Examiner is able to extract that the second path computation element in the second area communicates with the first path computation element in the first area, and then the first path computation element in the first area communicates with the third path computation element in the third area. Thus, inter-area is established. Additionally, within the claim language, there are also the virtual shortest path tree information with path(s) from the tail-end node to one or more border routers between the first and second areas, and the revised virtual shortest path tree information with path(s) from the tail-end node to one or more border routers between the first and third areas. However, Examiner is unable to find any relationship to Traffic Engineering LSP or any one path between the first area and a tail-end node, as recited in the preamble of claim 22. Furthermore, Examiner notes that the second and third areas may not be connected.

With regard to claim 26, it is unclear how the method completes the establishing a Traffic Engineering Label Switched Path (LSP) between the head-end node in the first area to the tail-end node in the second area. From the claim language, Examiner is able to extract that the first and second path computation elements in the first and second areas respectively communicates with each other. Additionally, within the claim language, there are also the path computation request and the virtual shortest path tree information with path(s) from the tail-end node to one or more border routers between the first and third areas. However, Examiner is unable to find any relationship to Traffic Engineering LSP or any one path between the head-end and the tail-end nodes, as recited in the preamble of claim 26. Furthermore, Examiner notes that the second and third areas may not be connected.

With regard to claims 34,38,43,46,52,56, these claims are computer-readable medium claims encompassing claims 4,8,13,16,22,26 respectively. Therefore, the same issues of claims 4,8,13,16,22,26 also apply to claims 34,38,43,46,52,56 respectively.

With regard to claims 65,66,67,68, these claims are apparatus claims encompassing claims 4,8,13,16 respectively. Therefore, the same issues of claims 4,8,13,16 also apply to claims 65,66,67,68 respectively.

With regard to claims 69 and 72, these claims are apparatus claims encompassing claims 4 and 8 respectively. Therefore, the same issues of claims 4 and 8 also apply to claims 69 and 72 respectively.



Dependent claims are rejected because they are dependent from rejected independent claims.

With regard to claim 13, the limitation "operating on a border router connected in both said third area and said second area" in lines 9 and 10 is unclear what it is referencing.

#### ***Allowable Subject Matter***

4. Claims 4,8,13,16,22,26,34,38,43,46,52,56,65,66,67,68,69,72 would be allowable if rewritten or amended to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action.
5. Claims 4-7,912,14,15,17,18,23-25,27-30,35-37,39-42,44,45,47,48,53-55,57-60,70,71,73,74 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.

#### ***Conclusion***

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Blanche Wong whose telephone number is 571-272-3177. The examiner can normally be reached on Monday through Friday, 830am to 530pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Edan Orgad can be reached on 571-272-7884. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2419

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Blanche Wong/  
Examiner, Art Unit 2419  
January 14, 2009

/Chirag G Shah/  
Supervisory Patent Examiner, Art Unit 2419